

CALIFORNIA WILDLIFE HABITAT RELATIONSHIPS SYSTEM
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A036 Red-spotted Toad *Bufo punctatus*
Family: Bufonidae Order: Anura Class: Amphibia

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DISTRIBUTION, ABUNDANCE, AND SEASONALITY

Red-spotted toads are found in the southeastern portion of California from Inyo Co. south to Mexico, and from below sea level in Death Valley to 2000 m (6500 ft) in Colorado. The red-spotted toad frequents arid and semi-arid regions. Its habitats include desert succulent shrub, desert scrub, alkalai scrub, desert wash, juniper, desert riparian, Joshua tree and palm oasis, among others. This species is often found near rocky areas, associated with spring seepages, intermittent stream courses, and cattle tanks (Bragg and Smith 1943, Stebbins, 1954, 1985, Tevis 1966, Mayhew 1968).

SPECIFIC HABITAT REQUIREMENTS

Feeding: Red-spotted toads feed on beetles, ants, bees, and other insects.

Cover: Found in prairie dog burrows, and under rocks (Turner 1959). Is known to frequent saline soils.

Reproduction: Eggs are often laid on the bottom of shallow rock-lined pools, and they are sometimes found in muddy bottoms of shallow temporary ponds. The water temperature must be between 22 and 34° C (72-96° F) for normal larval development (Ballinger and McKinney 1966).

Water: Permanent ponds or temporary pools are required for breeding. Other water requirements are not known.

Pattern: Dry, rocky areas near temporary sources of standing water are prime habitat for this species.

SPECIES LIFE HISTORY

Activity Patterns: This species is primarily nocturnal, but may be diurnal during breeding season. Individuals are dormant until March (Turner 1959). Adults are active at temperatures between 14 and 35° C (57-98° F) (Brattstrom 1963) and will emerge from burrows when temperatures are above 18° C (65° F) (Tevis 1966).

Seasonal Movements/Migration: No information. It is probable that adults will migrate from burrows to aquatic breeding sites just before the breeding season.

Home Range: Turner (1959) estimated a density of 8 per acre. Maximum movement was 1200 ft in 5 days, average distance was 300 ft in 11 to 20 days.

Territory: No data.

Reproduction: Breeding occurs from March to September. Adults start breeding when temperatures are above 21-24° C (70-75° F) after rainfall (Turner 1959, Tevis 1966). Individuals of this species are opportunistic, breeding during, or shortly after, heavy rainfall. Thirty to 5000 (mean = 1500) eggs are laid singly, or in small clusters (Stebbins 1954, Tevis 1966). The eggs require 72 hours to hatch, and the larvae 60 days to metamorphose (Wright and Wright 1949, Tevis 1966). Males reach sexual maturity in 3 years, females in 4 years (Mayhew 1968).

Niche: Spadefoot tadpoles are known to prey on the tadpoles of red-spotted toads (Ballinger and McKinney 1966). Eggs may be destroyed by flash-flooding of streams in which they are laid (Porter 1972). Many larvae are killed by desiccation (Tevis 1966).

Comments: Other common names used are: Spotted toad, Belding's toad, canyon toad, desert toad.

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